

## Northern Lights

by Arya Akhavan (July 2013)

Angles for R.I. = 1.620

53 + 12 girdles = 65 facets

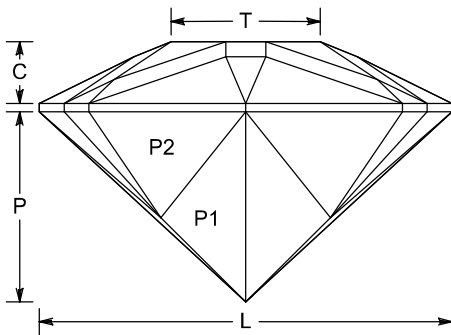
4-fold, mirror-image symmetry

80 index

$L/W = 1.000$   $T/W = 0.362$   $U/W = 0.362$

$P/W = 0.460$   $C/W = 0.149$

$Vol./W^3 = 0.219$



### PAVILION

P1	42.69°	01-19-21-39-41-59-61-79	Cut to centerpoint.
G1	90.00°	02-18-22-38-42-58-62-78	Set stone size.
P2	44.69°	02-18-22-38-42-58-62-78	Level girdle.
P3	41.50°	10-30-50-70	Meet P1, P2
G2	90.00°	10-30-50-70	Level girdle.

### CROWN

C1	27.24°	02-18-22-38-42-58-62-78	Set girdle width.
C2	23.96°	10-30-50-70	Level girdle.
C3	23.17°	04-16-24-36-44-56-64-76	Meet G1, G2, C1, C2
C4	26.17°	80-20-40-60	Meet G1, C1
C5	22.15°	80-20-40-60	Meet C1, C3, C4
C6	17.65°	10-30-50-70	Meet C2, C3
T	0.00°	Table	Meet C3, C5, C6

For some reason, I really like crown designs with thin bars tracing an outline. For this particular design, I was looking at a bunch of compass roses on old maps, and tried to incorporate a bit of that feel into the crown. Works in materials from quartz to rutile ( $RI = 1.54 - 2.62$ ) with no changes, best in heavily dichroic tourmaline. Suggested size = 8-15 mm

C:\Users\ARYADE~1\Pictures\DESIGN~1\WORKSI~1\37NORT~1.GEM